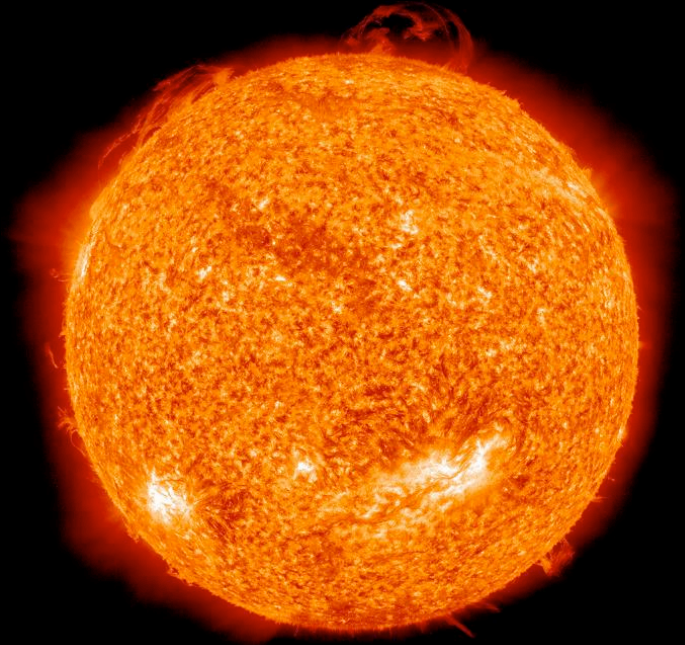# Software Innovations Speed Scientific Computing

Goddard Space Flight Center

Tech-X Corporation
Boulder, Colorado

NASA Technology

◆ The Heliophysics Division of NASA's Science Mission Directorate pursues a variety of missions to study the Sun

◆ NASA gathers a wealth of data on the Sun every day and deciphers it using a programming language called Interactive Data Language

Partnership

◆ As NASA requires ever greater computing power, it awarded a Small Business Innovation Research (SBIR) contract to Tech-X, which developed applications to run IDL on cluster systems

◆ The new arrangement increased performance in an environment familiar to the scientists while reducing the time needed to analyze large amounts of data

Benefits

◆ Tech-X's software, FastDL, process up to 40 times faster than previous applications

◆ With 70 employees, Tech-X has earned over $200,000 selling its NASA-derived technology

◆ An additional spinoff technology, GPULib (a library of mathematical functions to facilitate data processing) has been downloaded 10,000 times